

TOP SECRET

DATA CENTER OPERATIONS BRANCH

NDS OPERATIONS PROCEDURE MANUAL  
NO. P-L010

APPLICATIONS SOFTWARE  
13 April 1983

LNSQR11

SYMBOLIC TITLE: LNSQ11

PROGRAMMER:

25X1

TOP SECRET

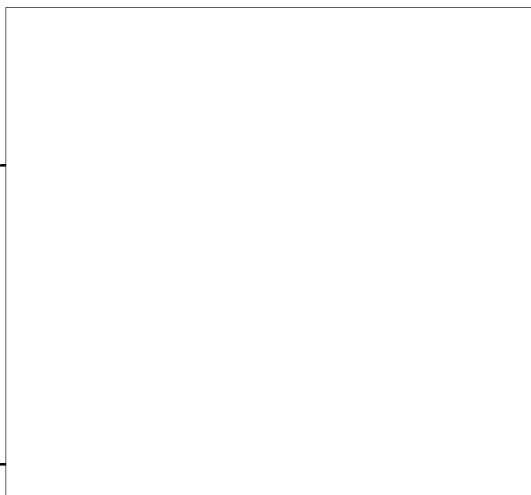
**TOP SECRET**

Program LNSQ11

Date 16 July 1981

APPROVALS

This operations manual has been reviewed and approved by the following persons:



23 Dec 81  
(date)

28 Dec 81  
(date)

25X1

**TOP SECRET**

**TOP SECRET**

Program LNSQ11

Date 16 July 81

**CONTENTS**

	<u>Page</u>
SUMMARY	1
OPERATIONAL FLOW CHART	2
COMPUTER RUN PREPARATION	3
PUNCHED CARD INPUT	3
HIGH-SPEED PRINTER OUTPUT	14
COMPUTER RUN PREPARATION SUMMARY	16
ON-LINE COMPUTER PROCESSING	17
EQUIPMENT REQUIREMENTS	17
NORMAL RUN INSTRUCTIONS	18
ABNORMAL RUN INSTRUCTIONS	20

**TOP SECRET**

**TOP SECRET**Program LNSQ11Date 16 July 81**SUMMARY**

The LINSQ11 program generates a listing for the Mission Analysis Branch (MAB), RSD/PSG for use with a mission file. LINSQ11 retrieves data from the MPF file to perform calculations on the frame and strip records within each mission for a given day.

In addition to calling two FORTRAN programs (SUB-LINSQ11/LNSQ11 and AZMUTH/LNSQ11) to compute linear mileage and square nautical mileage on both type of records, LNSQ11 computes the actual footage, the GMT, and the GSD, when necessary. Totals are given for each pass, as well as for the entire mission day.

LINSQ11 can be initialized by loading the provided card deck via a card reader. If the request form from MAB asks that the run be made for a specific date (rather than for the current date), MAB must keypunch a data card (to replace the standard data card of '999999') with the date specified by MAB using the format given on page 7a. When the run is completed, the original data card (with '999999') is to be replaced in the card deck, removing the data card prepared by TSS. The card deck is to be maintained by DCOB.

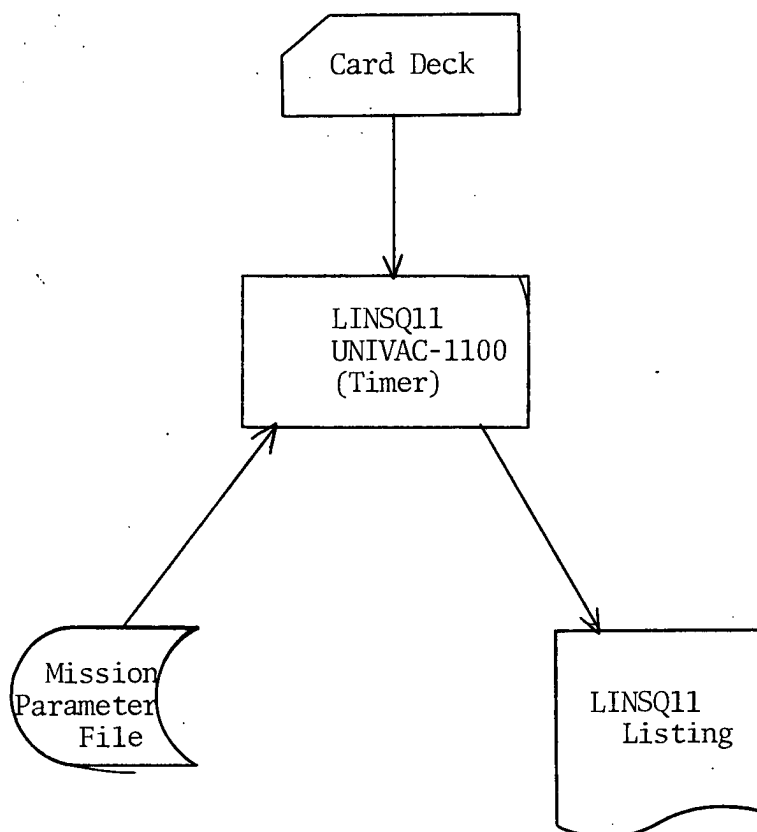
Copies of the LNSQ11 Listing should be forwarded to C/MAB/RSD/PSG.

**TOP SECRET**

Program LNSQ11

Date 16 July 81

OPERATIONAL FLOW CHART



**TOP SECRET**

TOP SECRET

Program LNSQ11

Date 16 July 81

## COMPUTER RUN PREPARATION

## PUNCHED CARD INPUT

Type: Control Card

Identification: @RUN

Format: @RUN,C/R LNSQ11,S33741016/BOLTON,XM1,0240

N = numeral

A = letter

X = any legitimate character  
in card code

S = special character

Z = optional character

ξ = plus

- = minus

<u>Field</u>	<u>Column</u>	<u>Comments</u>
1	1-8	SAAASASA
2	10-16	AAAAAAS
3	17-26	ANNNNNNNNS
4	27-33	AAAAAAS
5	34-37	ANNS
6	38-41	NNNN

TOP SECRET

**TOP SECRET**Program LNSQ11Date 16 July 81**COMPUTER RUN PREPARATION****PUNCHED CARD INPUT**

Type: Control Card

Identification: @ASG

Format: @ASG,A NDS\*PRODSHEMA.

N = numeral  
A = letter  
X = any legitimate character  
in card code

Z = optional character (letter of  
numeral)  
& = plus  
- = minus  
S = special character

<u>Field</u>	<u>Column</u>	<u>Comments</u>
1	1-6	SAAASA
2	9-23	AAASAAAAAAAAAAS

**TOP SECRET**

TOP SECRET

Program LNSQ11Date 16 July 81

## COMPUTER RUN PREPARATION

## PUNCHED CARD INPUT

Type: Control Card

Identification: @SYM

Format: @SYM PRINT\$. ,1,PR

N = numeral  
A = letter  
X = any legitimate character  
in card code

Z = optional character (letter of  
numeral)  
& = plus  
- = minus  
S = special character

<u>Field</u>	<u>Column</u>	<u>Comments</u>
1	1-4	SAAA
2	6-13	AAAASSS
3	14-15	NS
4	16-17	AA

TOP SECRET

TOP SECRET

Program LNSQ11Date 16 July 81

## COMPUTER RUN PREPARATION

## PUNCHED CARD INPUT

Type: Control Card

Identification: @ASG

Format: @ASG,A XMI\*P\$ABS.

N = numeral  
A = letter  
X = any legitimate character  
in card code

Z = optional character (letter of  
numeral)  
& = plus  
- = minus  
S = special character

FieldColumnComments

TOP SECRET

TOP SECRET

Program LNSQ11Date 16 July 81

## COMPUTER RUN PREPARATION

## PUNCHED CARD INPUT

Type: Control Card

Identification: @ERS

Format: @ERS TPF\$

N = numeral  
A = letter  
X = any legitimate character  
in card code

Z = optional character (letter of  
numeral)  
& = plus  
- = minus  
S = special character

FieldColumnComments

TOP SECRET

TOP SECRET

Program LNSQ11Date 16 July 81

## COMPUTER RUN PREPARATION

## PUNCHED CARD INPUT

Type: Control Card

Identification: @COPY,A

Format: @COPY,A XM1\*P\$ABS.LNSQ11,TPF\$

N = numeral

A = letter

X = any legitimate character  
in card codeZ = optional character (letter of  
numeral)

&amp; = plus

- = minus

S = special character

FieldColumnComments

TOP SECRET

TOP SECRET

Program LNSQ11Date 16 July 81

## COMPUTER RUN PREPARATION

## PUNCHED CARD INPUT

Type: Control Card

Identification: @FREE

Format: @FREE XML\*P\$ABS.

N = numeral

A = letter

X = any legitimate character  
in card codeZ = optional character (letter of  
numeral)

+ = plus

- = minus

S = special character

FieldColumnComments

TOP SECRET

Program LNSQ11

Date 16 July 81

COMPUTER RUN PREPARATION

PUNCHED CARD INPUT

Type: Control Card

Identification: @XQT

Format: @XQT TPF\$.LNSQ11

N = numeral  
A = letter  
X = any legitimate character  
in card code

Z = optional character (letter of  
numeral)  
& = plus  
- = minus  
S = special character

Field

Column

Comments

TOP SECRET

TOP SECRET

Program LNSQ11Date 16 July 1981

## COMPUTER RUN PREPARATION

## PUNCHED CARD INPUT

Type: Data Card

Identification:

Format: 999999

N = numeral  
A = letter  
X = any legitimate character  
in card code

Z = optional character (letter of  
numeral)  
& = plus  
- = minus  
S = special character

<u>Field</u>	<u>Column</u>	<u>Comments</u>
1	1-6	NNNNNN

TOP SECRET

**TOP SECRET**Program LNSQ11Date 16 July 81

## COMPUTER RUN PREPARATION

## PUNCHED CARD INPUT

Type: Control Card

Identification: @FIN

Format: @FIN

N = numeral  
A = letter  
X = any legitimate character  
in card code

Z = optional character (letter of  
numeral)  
& = plus  
- = minus  
S = special character

<u>Field</u>	<u>Column</u>	<u>Comments</u>
1	1-4	SAAA

**TOP SECRET**

SECRET

Program LNSQ11

Date 16 July 81

PUNCHED CARD INPUT (Continued)

Source: Card deck maintained by DCOB-

Sequence:

Restrictions:

Peripheral Device: Card Reader and Printer

Quantity:

Disposition: Card deck maintained in DCOB

SECRET

SECRET

Program LNSQ11

Date 16 July 81

HIGH-SPEED PRINTER OUTPUT

Identification: LNSQ11

Format: (See sample on page 11)

Type of Form:

Disposition: Forward to C/MAB/RSD/PSG

SECRET

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COMPUTER RUN PREPARATION SUMMARY

Assembly System: SPURT FD \_\_\_\_\_ SPRYE \_\_\_\_\_ ALGOL \_\_\_\_\_ FORTRAM IV \_\_\_\_\_ COBOL X \_\_\_\_\_ SIMSCRIPT \_\_\_\_\_  
Hardware System: Univac 1100 (Timer) Run Sequence \_\_\_\_\_ of \_\_\_\_\_  
Application: \_\_\_\_\_ Program Name LNSQ11 Programmer                      Core: Min \_\_\_\_\_ Ma25X1  
Drum: \_\_\_\_\_ Estimated Run Time: \_\_\_\_\_

MAGNETIC TAPE (File Protect All Output Tapes)

Logical Servo No. \_\_\_\_\_  
or Symbolic Name \_\_\_\_\_  
Work \_\_\_\_\_  
Input/Output \_\_\_\_\_  
Standard Tape \_\_\_\_\_  
Label (See OPB/TAS) \_\_\_\_\_

Disposition: Reten- \_\_\_\_\_  
Save, List, & tion \_\_\_\_\_  
Release Period \_\_\_\_\_  
Next Phase \_\_\_\_\_  
[Prog. Name(s)] \_\_\_\_\_

INPUT

\_\_\_\_\_ Data Cards - Prog. Controlled (Volume) \_\_\_\_\_  
\_\_\_\_\_ Parameters - Prog. Controlled (Volume) \_\_\_\_\_  
\_\_\_\_\_ Parameters - Oper. Load as Errata (Volume) \_\_\_\_\_  
\_\_\_\_\_ Paper Tape (Volume) \_\_\_\_\_

1004 Board Name (no.) \_\_\_\_\_ Carriage Tape \_\_\_\_\_ OUTPUT On XX Off \_\_\_\_\_ Line \_\_\_\_\_  
Off Line Estimated Run Time: \_\_\_\_\_ (Hours & Tenths)

Printer (Type Paper/No. of Copies) 143/1 copy

Cards on \_\_\_\_\_ Off \_\_\_\_\_ Line: \_\_\_\_\_ Plotter On \_\_\_\_\_ Off \_\_\_\_\_ Line: \_\_\_\_\_  
(Volume) (Amount of paper in feet)

Other On \_\_\_\_\_ Off \_\_\_\_\_ Line: \_\_\_\_\_  
(Volume)

TOP SECRET

TOP SECRET

Program LNSQ11

Date 16 July 81

## ON-LINE COMPUTER PROCESSING

### EQUIPMENT REQUIREMENTS

Computer: Univac 1100 (Timer)

Schema Used:

Storage:

Core Required -

I Bank -

D Bank -

Peripheral Devices: Card Reader; Printer

Restrictions:

Files Accessed:

Files Created/Deleted:

File Size:

Approximate Number of Accesses:

TOP SECRET

TOP SECRET

Program LNSQ11

Date 16 July 81

# NORMAL RUN INSTRUCTIONS

Initiation: Load card deck in reader and run job. Use 999999 for date unless otherwise specified.

Monitor:

Message

Cause

Operator Action

None

TOP SECRET

Program LNSQ11

Date 16 July 81

NORMAL RUN INSTRUCTIONS (Continued)

```
1: @RUN LNSQ11, S33741016/BOLTON, XM1
2: @ASG, A NDS*PRODSHEMA.
3: @SYM PRINT$, 1, PR
4: @ASG, A XM1*P$ABS.
5: @ERS TPF$.
6: @COPY, A XM1*P$ABS. LNSQ11, TPF$.
7: @FREE XM1*P$ABS.
8: @XQT TPF$. LNSQ11
9: 811208
10: @FIN
```

Interrupt/Reentry: None

Termination: Standard

Take-down: Replace card deck in DCOB storage for future use.

II Keyins:

Disposition of Data: Forward output to C/MAB/RSD/PSG.

~~TOP SECRET~~

Program LNSQ11Date 16 July 81

## ABNORMAL RUN INSTRUCTIONS

## Messages:

<u>Message</u>	<u>Cause</u>	<u>Operator Action</u>
EN-ERROR, ERROR STATUS IS ERROR-STATUS	DMS Problem	Try again, if same error occurs, call CSD.
***ERROR ON ROLLBACK*** As well as message above	DMS Problem	Same as above.

~~TOP SECRET~~

SECRET

### XMI\*P\$SYM.AZMUTH/LNSQ11

Three different versions of AZMUTH, a LNSQ11 subroutine, are on the 1100/40 Operational System:

- 1) XES\*S-YOPTION.AZMUTH/AZM
- 2) LIB\*SYM.AZMUTH/AZM
- 3) C494\*SYM.AZMUTH/AZM

It is not known which version of AZMUTH was used to create the absolute for LNSQ11 on the 1100/40; therefore, all three versions were tested on the 1100/80 system. Of the three, LIB\*SYM.AZMUTH/AZM was the only one that worked on the 1100/80 and is the version that was used to create the absolute for the 1100/80 converted version of LNSQ11.

SECRET

~~TOP SECRET~~

## OPERATIONS BRANCH WORK REQUEST

TO: PRODUCTION ANALYSIS SECTION/OB/AID/PDG

PAS NO. (Leave blank)		COMPONENT CODE S42		PROJECT NO. 730000		<b>TYPE RUN</b> <input type="checkbox"/> PRODUCTION <input type="checkbox"/> CHECKOUT <input type="checkbox"/> ASSEMBLE <input type="checkbox"/> COMPILE <input type="checkbox"/> OPEN SHOP <input type="checkbox"/> ATTENDED <input type="checkbox"/> KEYPUNCH <input type="checkbox"/> OTHER _____		IN           PAS           OUT           DEAD LINE OUT		25X1	
REQUESTER		PHONE NO.		QUANTITY							
PRODUCT											
SECURITY CLASSIFICATION											
CONTROL NUMBER											
<b>TYPE FORM</b> <input type="checkbox"/> 1471 <input type="checkbox"/> 1468 <input type="checkbox"/> 116 OTHER _____		<b>D &amp; BS</b> BIND Y N BURST Y N TRIM R L		<b>INPUT</b> <input type="checkbox"/> TAPE(S) <input type="checkbox"/> CARDS <input type="checkbox"/> NONE OTHER _____		<b>OUTPUT</b> <input type="checkbox"/> TAPE(S) <input type="checkbox"/> CARDS <input type="checkbox"/> PRINTER OTHER _____		<b>PROGRAM LOAD</b> <input type="checkbox"/> TELETYPE <input type="checkbox"/> CONSOLE <input type="checkbox"/> CARDS			
DATA CONTROLLER		QUALITY CONTROL IN		QUALITY CONTROL OUT		COMPUTER RM.SUPERVISOR		CUST PICKUP		BADGE NO. OUT	
DATE		DATE		DATE		DATE					
BADGE NO.		BADGE NO.		BADGE NO.		BADGE NO.					

## JOB DESCRIPTION

OP

Please run LNSQ11 with the following date card:

 YYMMDD  
 810105

25X1

1

PRYOR 5081

Approved For Release 2008/03/12 : CIA-RDP94T00858R000601600001-6

[illegible]

8SYM PRINT\$. , 1, FR

Approved For Release 2008/03/12 : CIA-RDP94T00858R000601600001-6

[illegible][illegible][illegible][illegible][illegible][illegible][illegible][illegible][illegible]

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[illegible]

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[illegible]

Approved For Release 2008/03/12 : CIA-RDP94T00858R000601600001-6

[illegible]

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Approved For Release 2008/03/12 : CIA-RDP94T00858R000601600001-6

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11

PRYOR 5081